Please amend claims 1-17 as follows:

1. (Amended) An arrangement [Arrangement] for predicting an abnormality
of a dynamic system and for implementing an action opposing the abnormality,
comprising:

5   a) [whereby] a measured data pick-up [is provided] that registers

comparison measured data of said [the] system and test measured

data of said [the] system; [,]

b) [comprising] a processor unit, having a neural network that models said

system, said processor unit [that is configured such that the

10   following steps can be implemented:]

[c)] (1)training said [a] neural network [that describes the system is

trained upon employment of] using said [the] comparison measured

data;

(2) determining a comparison information flow that describes a

15   comparison dynamic of said [the] system [is determined

upon employment of] using said [the] trained neural

network;

(3) determining a test information flow that describes a test

dynamic of said [the] system [is determined upon

20   employment of] using said [the] test measured data;

(4) [upon employment of] using said [the] comparison

information flow and [of] said [the] test information

flow, predicting said [the] abnormality [is predicted] as

established when said [the] comparison information flow

25   differs significantly from said [the] test information flow

and predicting said [the] abnormality [is predicted] as

not established when said [the] comparison information

flow does not significantly differ from said [the] test

information flow;

(5) when said [the] abnormality of the system has been

predicted as established, then implementing said [the]

action [is implemented]; and

c) [whereby] an actuator that implements said [the] action [is

provided].

2. (Amended) An arrangement [Arrangement] according to claim 1, wherein said [whereby the steps (2) and (5) of the] processor unit endlessly loops from said step of determining a comparison information flow to said step of implementing said action [form an endless loop].

3. (Amended) An arrangement [Arrangement] according to claim 1 [or 2], wherein said [whereby the] abnormality is predicted as established when said test information flow is significantly smaller than said [the] comparison information flow.

4. (Amended) An arrangement [Arrangement] according to claim 3, wherein said [whereby the] action comprises [is comprised in] exciting said [the] system with a chaotic signal.

5. (Amended) An arrangement [Arrangement] according to claim 4, wherein said [whereby the] action comprises supplying [is comprised in suppling] noise to said [the] system.

6. (Amended) An arrangement [Arrangement] according to claim 5, wherein said [whereby the] noise is supplied by [on the basis of] a corresponding electrical field.

7. (Amended) <u>An arrangement</u> [Arrangement] according to claim 6, <u>wherein said</u> [whereby the] electrical field is supplied <u>by</u> [on the basis of] at least one electrode.

8. (Amended) <u>An arrangement</u> [Arrangement] according claim 5, <u>wherein said</u> [whereby the] noise is supplied <u>by</u> [on the basis of] a corresponding magnetic field.

9. (Amended) <u>An arrangement</u> [Arrangement] according to claim 8, <u>wherein said</u> [whereby the] magnetic field is supplied <u>by</u> [on the basis of] at least one electrode.

10. (Amended) <u>An arrangement</u> [Arrangement] according to claim 1 [or 2], <u>wherein said</u> [whereby the] abnormality is predicted as established when <u>said</u> test information flow is significantly greater than <u>said</u> [the] comparison information flow.

11. (Amended) <u>An arrangement</u> [Arrangement] according to claim 10, <u>wherein said</u> [whereby the] action <u>comprises</u> [is comprised in] exciting <u>said</u> [the] system with a regular signal.

12. (Amended) <u>An arrangement</u> [Arrangement] according to claim 11, <u>wherein said</u> [whereby the] regular signal is supplied <u>by</u> [on the basis of] an electrical field.

13. (Amended) <u>An arrangement</u> [Arrangement] according to claim 11, <u>wherein said</u> [whereby the] electrical field is supplied <u>by</u> [on the basis of] at least one electrode.

14. (Amended) <u>An arrangement</u> [Arrangement] according to claim 11, <u>wherein said</u> [whereby the] regular signal is supplied <u>by</u> [on the basis of] a magnetic field.

15. (Amended) <u>An arrangement</u> [Arrangement] according to claim 14, <u>wherein said</u> [whereby the] magnetic field is supplied to <u>said</u> [the] system <u>by</u> [on the basis of] at least one electrode.

16. (Amended) <u>A method</u> [Method] for predicting an abnormality of a dynamic system and for implementing an action opposing the abnormality, [whereby] <u>comprising the steps of:</u>

a) <u>measuring</u> comparison measured data of <u>said</u> [the] system and test measured data of <u>said</u> [the] system, [are measured,]

b) <u>determining</u> a neural network that <u>models said</u> [describes the] system [is determined upon employment of] <u>using said</u> [the] comparison measured data;

c) <u>determining</u> a comparison information flow that describes a comparison dynamic of <u>said</u> [the] system [is determined upon employment of] <u>using said</u> [the] neural network;

d) <u>determining</u> a test information flow that describes a test dynamic of <u>said</u> [the] system [is determined upon employment of] <u>using said</u> [the] test measured data;

e) <u>comparing said comparison information flow to said test information flow</u> [e] upon employment of] <u>using said</u> [the] comparison information flow and of <u>said</u> [the] test information flow; [,]

f) <u>determining said</u> [the] abnormality <u>to be</u> [is] predicted as established when <u>said</u> [the] comparison information flow differs significantly from <u>said</u> [the] test information flow; [and]

g) <u>determining said</u> [the] abnormality <u>to be</u> [is] predicted as not established when <u>said</u> [the] comparison information flow does

not significantly differ from said [the] test information flow; and

h) [f)] implementing said action when said [the] abnormality of said [the] system has been predicted as established[, then the action is implemented].

5   17. (Amended) A method [Method] for predicting an abnormality of a dynamic system, comprising the steps of: [whereby]

a) measuring comparison measured data of said [the] system and test measured data of said [the] system: [are measured,]

b) determining a comparison information flow that describes a

10   comparison dynamic of said [the] system [is determined upon employment of] using said [the] comparison measured data;

c) [d)] determining a test information flow that describes a test dynamic of said [the] system [is determined upon employment of] using said [the] test measured data;

15   d) comparing said comparison information flow to said test information flow [e) upon employment of] using said [the] comparison information flow and of said [the] test information flow: [,]

e) determining said [the] abnormality to be [is] predicted as established when said [the] comparison information flow differs

20   significantly from said [the] test information flow: [and]

f) determining said [the] abnormality to be [is] predicted as not established when said [the] comparison information flow does not significantly differ from said [the] test information flow.

IN THE ABSTRACT

25   **On page 12:**

cancel lines 2-3;

in line 4, cancel "is" and substitute --and method are-- therefor, and cancel "enables" and substitute --enable-- therefor;